

# UNITED STATES DEPARTMENT OF COMMERCE Patent and Trademark Office

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APPLICATION NO.	TION NO. FILING DATE FIRST NAMED INVENTOR			ATTORNEY DOCKET NO.		
8/993,271	12/18/97	MEYERHOEFER		С	0720-4058	
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10RGAN & FIN	NEGAN	LM02/0902		CHENEY.C		
345 PARK AVENUE						PAPER NUMBER
IEW YORK NY	10154			2747		
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Please find below and/or attached an Office communication concerning this application or proceeding.

**Commissioner of Patents and Trademarks** 

# Application No.

08/993,271

Applicant(s)

#### Meyerhoefer

Examiner

Office Action Summary

Clark S. Cheney

Group Art Unit 2747



Responsive to communication(s) filed on <u>Dec 18, 1997</u>	·					
☐ This action is <b>FINAL</b> .						
Since this application is in condition for allowance except for form in accordance with the practice under Ex parte Quayle, 1935 C.D.						
A shortened statutory period for response to this action is set to exp is longer, from the mailing date of this communication. Failure to resapplication to become abandoned. (35 U.S.C. § 133). Extensions of 37 CFR 1.136(a).	spond within the period for response will cause the					
Disposition of Claims						
	is/are pending in the application.					
Of the above, claim(s)	is/are withdrawn from consideration.					
☐ Claim(s)	is/are allowed.					
	is/are rejected.					
Claim(s)	is/are objected to.					
☐ Claims are subject to restriction or election requirement.						
Application Papers  See the attached Notice of Draftsperson's Patent Drawing Rev						
The drawing(s) filed on is/are objected to						
☐ The proposed drawing correction, filed on	_ is □approved □disapproved.					
☐ The specification is objected to by the Examiner.						
☐ The oath or declaration is objected to by the Examiner.						
Priority under 35 U.S.C. § 119  Acknowledgement is made of a claim for foreign priority unde  All Some* None of the CERTIFIED copies of the received.						
received in Application No. (Series Code/Serial Number)						
received in this national stage application from the Inter *Certified copies not received:						
Acknowledgement is made of a claim for domestic priority und	der 35 U.S.C. § 119(e).					
Attachment(s)  Notice of References Cited, PTO-892						
☐ Information Disclosure Statement(s), PTO-1449, Paper No(s).						
☐ Interview Summary, PTO-413	<del></del>					
☐ Notice of Draftsperson's Patent Drawing Review, PTO-948						
☐ Notice of Informal Patent Application, PTO-152						
SEE OFFICE ACTION ON THE F	OLLOWING PAGES					

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#### **DETAILED ACTION**

### **Drawings**

1. This application has been filed with informal drawings which are acceptable for examination purposes only. Formal drawings will be required when the application is allowed.

## **Double Patenting**

2. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321© may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

3. Claims 1, 3, 4, and 6 are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1 through 7 of U.S. Patent No. 5,790,363 in view of 47 C.F.R. 68.502(e)(2) and 68.502(e)(4).

Chaudhry in U.S. Patent No. 5,790,363 (hereafter referred to as "the patent '363") claims in claims 1 through 7 an overvoltage protection circuit for Ethernet networks using unshielded

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twisted pair cabling. Claim 1 of the patent '363 claims connection of a first overvoltage protection circuit in series with first and second twisted wires carrying incoming digital signals and connection of a second overvoltage protection circuit in series with third and fourth twisted wires carrying outgoing digital signals. Claim 2 claims a similar arrangement. The claimed connections inherently claim electrical connectors. However, Chaudhry does not specifically claim an interconnection module for connecting the apparatus to the destination.

The Federal Communications Commission specified in 47 C.F.R. 68.502(e)(2) and 68.502(e)(4) that an RJ45 connector is typically used as a line interface with "programmed data equipment." The history of this section of code shows 68.502 not to have been modified since Jan. 9, 1986. The connector (having male and female components) is described as a bridged tip and ring, 8-position keyed data jack, and can include singular or multiple mounting arrangements. It is notoriously well-known in the art to use such an interconnection module in an Ethernet network. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to connect the overvoltage protection circuit of Chaudhry to an RJ45 connector since such a making such a connection is the purpose for which the connector was intended. See *Sinclair & Carroll Co. V. Interchemical Corp.*, 325 U.S. 327, 65 USPQ 297 (1945) and *In re Leshin*, 227 F.2d 197, 125 USPQ 416 (CCPA 1960). Such an obvious modification to the claims of U.S. Patent No. 5,790,363 is not patentably distinct.

4. Claims 2, 5, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 18, and 19 are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1

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through 7 of U.S. Patent No. 5,790,363 ("the patent '363") in view of 47 C.F.R. 68.502(e)(2) and 68.502(e)(4) ("the code"), as applied to claims 1, 3, 4, and 6 above, and further in view of Meyerhoefer et al.

Meyerhoefer discloses rocker arm wire termination devices suitable for interfacing subscriber lines with provider lines (column 8, lines 35-50; claim 4, etc.). Meyerhoefer does not specify the use of such contacts in an Ethernet network. However, Meyerhoefer does teach that the rocker arm wire termination devices are suitable for use with 24 AWG or 22 AWG wire (column 3, lines 43-55). The use of 24 AWG or 22 AWG wire in unshielded twisted pair for Ethernet networks is notoriously well known in the art.

The implementation of an RJ45 connector as described in the code with the patent '363 is obvious, as described in the rejection of claim 1. Thus, it would have been obvious for a person of ordinary skill in the art at the time the invention was made to use the rocker arm wire termination devices of Meyerhoefer along with an RJ45 connector to connect the overvoltage protection circuit of the patent '363 to a network since both devices are intended for such purposes. See *Sinclair & Carroll Co. V. Interchemical Corp.*, 325 U.S. 327, 65 USPQ 297 (1945) and *In re Leshin*, 227 F.2d 197, 125 USPQ 416 (CCPA 1960). Such an obvious modification to the claims of U.S. Patent No. 5,790,363 is not patentably distinct. *As per claim 9:* 

The patent '363 claims two overvoltage protection circuits in claim 2, one in section 2(a), the other in section 2(b). Sections 2(a)(2) and 2(b)(2) claim a gas discharge tube. Sections

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2(a)(4) and 2(b)(4) claim a diode bridge with an avalanche diode connected across the diode bridge.

As per claim 10:

The patent '363 claims in claim 2 a pair of positive temperature coefficient resistors for providing overcurrent protection, arranged as the applicant claims, in sections 2(a)(2) and 2(b)(2).

As per claims 11 and 12:

The implementation of an RJ45 jack or jacks in this intended purpose is not patentably distinct, as noted above.

As per claims 13 through 16:

These claims simply use two connection devices (isolation displacement contacts and RJ45 connectors) in various configurations in the manner in which the devices were intended to be used. This is not patentably distinct, as noted above.

As per claims 18 and 19:

Claim 4 of Meyerhoefer claims a rocker arm type wire termination with a pivot for mounting. A description of and discussion of multiple terminators is found in column 8, lines 35-50.

5. Claims 17 and 20 through 33 are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1 through 7 of U.S. Patent No. 5,790,363 ("the patent '363") in view of 47 C.F.R. 68.502(e)(2) and 68.502(e)(4) ("the

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code"), as applied to claims 1, 3, 4, and 6 above, and further in view of Meyerhoefer et al., as applied to claims 2, 5, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 18, and 19, and further in view of Collins et al.

As per claim 17:

Collins claims a subscriber line network interface with a Keptel footprint in claim 7. Although Collins does not disclose the use of the device in an Ethernet network interface, the device is aptly suited for such a purpose. All other limitations have been discussed above. Thus, it would have been obvious for a person of ordinary skill in the art at the time the invention was made to utilize the Keptel footprint of Collins in the Ethernet network interface of Meyerhoefer since such a use is within the spirit and scope of the intended use of Collins' invention.

As per claim 20:

Meyerhoefer claims that the rocker arm wire terminations can be mounted to an enclosure with a cover (claims 1, 4, and 46). All other limitations have been discussed above. Thus, it would have been obvious for a person of ordinary skill in the art at the time the invention was made to mount the rocker arm wire terminations into an enclosure since such a mounting is the purpose for which Meyerhoefer provided mounting means on his device.

As per claims 21, 22, 23, 26, and 27:

These claims simply use two connection devices (isolation displacement contacts and RJ45 connectors) in various configurations in the manner in which the devices were intended to be used. This is not patentably distinct, as noted above.

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As per claim 24:

The patent '363 claims two overvoltage protection circuits in claim 2, one in section 2(a), the other in section 2(b). Sections 2(a)(2) and 2(b)(2) claim a gas discharge tube. Sections 2(a)(4) and 2(b)(4) claim a diode bridge with an avalanche diode connected across the diode bridge.

As per claim 25:

The patent '363 claims a pair of positive temperature coefficient resistors for providing overcurrent protection, arranged as the applicant claims, in sections 2(a)(2) and 2(b)(2) of claim 2.

As per claim 28:

Claim 20, upon which this claim depends, has been rejected as described above. The further limitations of this claim are obvious, as discussed in the rejection of claim 17 above.

Claims 29 through 33 only differ from many of the claims of Meyerhoefer in that applicant claims 29 through 33 include the addition of an Ethernet network overvoltage protection interface in the enclosure of Meyerhoefer. The Ethernet interface is of the same style as other interfaces in the enclosure. Meyerhoefer claims a modular device adapted to be mounted in an enclosure with a plurality of similar devices in claim 1. An Ethernet network interface with overvoltage protection such as the one disclosed by the patent '363 (with obvious electrical connectors as described above) is certainly similar in both structure and function as the telephone

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overvoltage protection interface claimed by Meyerhoefer. Therefore, it would have been obvious to a person of ordinary skill at the time the invention was made to house the Ethernet network interface in the enclosure claimed by Meyerhoefer.

As per claim 29:

Meyerhoefer claims a telephone network/subscriber interface having overvoltage protection in claims 11 and 12.

As per claim 30:

Meyerhoefer claims a subscriber bridge module mounted in an enclosure for connecting telephone company and subscriber voice lines in claims 1 and 11.

As per claim 31:

The further limitations of this claim are set out nearly identically in claims 1, 7, 8, and 9 of Meyerhoefer.

As per claim 32:

Meyerhoefer claims these further limitations in claims 11 and 12.

As per claims 33:

Claims 18 through 29 of Meyerhoefer claim a device meeting the limitations of this claim using nearly identical language.

6. Claims 34 through 38 are rejected under the judicially created doctrine of obviousnesstype double patenting as being unpatentable over claims 1 through 7 of U.S. Patent No. 5,790,363 in view of 47 C.F.R. 68.502(e)(2) and 68.502(e)(4) ("the code"), as applied to claims

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1, 3, 4, and 6 above, and further in view of Meyerhoefer et al., as applied to claims 2, 5, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 18, and 19 above, and further in view of Collins et al., as applied to claims 17 and 20 through 33 above, and further in view of U.S. Patent No. 5,566,056 to Chaudhry (Chaudhry '056).

Claims 34 through 38 simply place the following elements in the same enclosure with an Ethernet overvoltage protection apparatus: coaxial network interfacing, a telephone subscriber bridge module, and a telephone overvoltage protection apparatus. Except for the housing, these elements are not connected in any meaningful way. Meyerhoefer discloses in column 6, lines 45-56, that coaxial connectors may be mounted as a modular device in the enclosure described. However, Meyerhoefer does not detail what might compose such a coaxial modular device. Chaudhry '056 discloses a coaxial surge arrestor by reference (column 1, lines 35-37). The attributes and intended purpose of this device, as described in column 2, lines 32-58, show it to be appropriately similar to the other devices mounted in the enclosure claimed by Meyerhoefer (see discussion above). These attributes include impedance matching, surge arresting, voltage protection, and a suitable frequency range for telecommunications. Further, this device may be mounted with conventional coaxial cable components. Thus, it would have been obvious for a person of ordinary skill in the art at the time the invention was made to include coaxial network interfacing of Chaudhry '056, telephone bridge and overvoltage protection elements of Meyerhoefer, and the obvious Ethernet overvoltage protection circuitry of the patent '363 (as

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described above) in the enclosure of Meyerhoefer since all of these elements are similar in both structure and purpose.

As per claim 34:

Meyerhoefer discloses in column 6, lines 45-56, that coaxial connectors may be mounted in the enclosure described.

As per claim 35:

Chaudhry '056 claims in claim 1, using similar language, the same coaxial surge arrestor as the applicant.

As per claim 36:

Meyerhoefer discloses in column 6, lines 45-56, that coaxial connectors may be mounted in the enclosure described. Meyerhoefer claims the limitations of an overvoltage protection apparatus and a subscriber line bridge module in claims 11 and 12.

As per claim 37:

In combination with the disclosure mentioned in the rejection of claim 36, claims 18 through 29 of Meyerhoefer claim a device meeting the limitations of this claim using nearly identical language.

As per claim 38:

Chaudhry '056 claims in claim 1, using similar language, the same coaxial surge arrestor as the applicant.

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7. Any inquiry concerning this communication should be directed to Clark S. Cheney,
Patent Examiner, whose telephone number is (703) 306-5836. The examiner can normally be

reached on Monday through Friday from 7:30 a.m. to 4:00 p.m., E.S.T.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Forester W. Isen, can be reached at (703) 305-4386. The fax phone number for the organization where this application or proceeding is assigned is (703) 308-5403.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 305-3900.

FORESTER W. ISEN
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2700